

Fig. 1

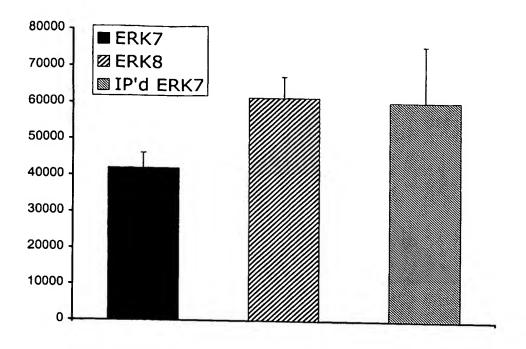


Fig. 2

Fig.

Rat ERK7 Mouse ERK7 Human ERK8	MCAAEVDRHVSQRYLIKRRLGKGAYGIVWKAMDRRTGEVVAIKKIFDAFRDQTDAQRTFR 60 MCAAEVDRHVAQRYLIKRRLGKGAYGIVWKAMDRRTGEVVAIKKIFDAFRDQIDAQRTFR 60 MCT-VVDPRIVRRYLLRRQLGQGAYGIVWKAVDRRTGEVVAIKKIFDAFRDKTDAQRTFR 59 **: **::::::::::::::::::::::::::::::::
Rat ERK7 Mouse ERK7 Human ERK8	EIMLLREFGGHPNIIRLLDVIPAKNDRDIYLVFESMDTDLNAVIQKGRLLEDIHKRCIFY 120 EIMLLKEFGGHPNIIRLLDVIPAKNDRDIYLVFESMDTDLNAVIQKGRLLKDIHKRCIFY 120 EITLLQEFGDHPNIISLLDVIRAENDRDIYLVFEFMDTDLNAVIRKGGLLQDVHVRSIFY 119 ** **;***,**** *;**** *;***************
Rat ERK7 Mouse ERK7 Human ERK8	QLLRATKFIHSGRVIHRDQKPANVLLDAACRVKLCDFGLARSLSDFPEGPGGQALTEYVA 180 QLLRATKFIHSGRVIHRDQKPANVLLDSACRVKLCDFGLARSLGDLPEGPGGQALTEYVA 180 QLLRATRFLHSGHVVHRDQKPSNVLLDANCTVKLCDFGLARSLGDLPEGPEDQAVTEYVA 179 *****;*:***;**************************
Rat ERK7 Mouse ERK7 Human ERK8	TRWYRAPEVLLSSRWYTPGVDMWSLGCILGEMLRGQPLFPGTSTFHQLELILETIPLPSM 240 TRWYRAPEVLLSSRWYTPGVDMWSLGCILGEMLRGQPLFPGTSTFHQLELILKTIPLPSM 240 TRWYRAPEVLLSSHRYTLGVDMWSLGCILGEMLRGRPLFPGTSTLHQLELILETIPPPSE 239 ************************************
Rat ERK7 Mouse ERK7 Human ERK8	EELQGLGSDYSALILQNLGSRPRQTLDALLPPDTPPEALDLLKRLLAFAPDKRLSAEQAL 300 EELQDLGSDYSALILQNLGSRPQQTLDALLPPDTPPEALDLLKRLLAFAPDKRLSAEQAL 300 EDLLALGSGCRASVLHQLGSRPRQTLDALLPPDTSPEALDLLRRLLVFAPDKRLSATQAL 299 *:* ***. *:::****:*********************
Rat ERK7 Mouse ERK7 Human ERK8	QHPYVQRFHCPDREWTRGSDVRLPVHEGDQLSAPEYRNRLYQMILERRRNSRSPREED-L 359 QHPYVQRFHCPDREWARESDVRLPVHEGDQLSAPEYRKRLYQIILEQSGNSRSPREEG-L 359 QHPYVQRFHCPSDEWAREADVRPRAHEGVQLSVPEYRSRVYQMILECGGSSGTSREKGPE 359

Fig. 3 (continued)

GVVASRAELRASQRQSLKPGVLPQVLAETPARKRGPKPQNGHGHDPEHVEV 410 GVVASRAELRASPARTQSLKSGVLPQVPAETPARKRGPKPPRSPGHDPEHVEV 412 GVSPSQAHLHKPRADPQLPSRTPVQGPRPRPQSSPGHDPAEHESPRAAKNV 410 ** .*:*.*:	RRQSSDPLYQLPPPGSGERPPGATGEPPSAPSGVKTHVRAVAPSLTSQAAAQAANQPLIR 470 RRQSSDPLFQLPPPGRGERPPGATGQPPSAPSGVKTQVRAMAPSLTSQAEAQAANQALIR 472 PRQNSAPLLQTALLGNGERPPGAKEAPPLTLSLVKPSGRGAPSLTSQAAAQVANQALIR 470 **.* * * * * * * * * * * * * * * * * *	SDPARGGGPRAVGARRVPSRLPREAPEPRPGRRMFGISVSQGAQGAARAALGGYSQAYGT 530 SDPARGGGPRAVGARRVPSRLPREAPEPRPGRRMFGISVSQGAQGAARAALGGYSQAYGT 532 GDWNRGGGVRVASVQQVPPRLPPEARPGRRMFSTSALQGAQGGARALLGGYSQAYGT 527 . **** *::**.**	VCRSALGRLPLLPGPRA 547 VCRSALGRLPLLPGPRA 549 VCHSALGHLPLLEGHHV 544 **:***:*** :.
kat ERK <i>1</i>	Rat ERK7	Rat ERK7	Rat ERK7
Mouse ERK7	Mouse ERK7	Mouse ERK7	Mouse ERK7
Human ERK8	Human ERK8	Human ERK8	Human ERK8

CLUSTAL W (1.82) Multiple Sequence Alignments

Fig. 4 Erk8 Expression in Different Breast Cancers

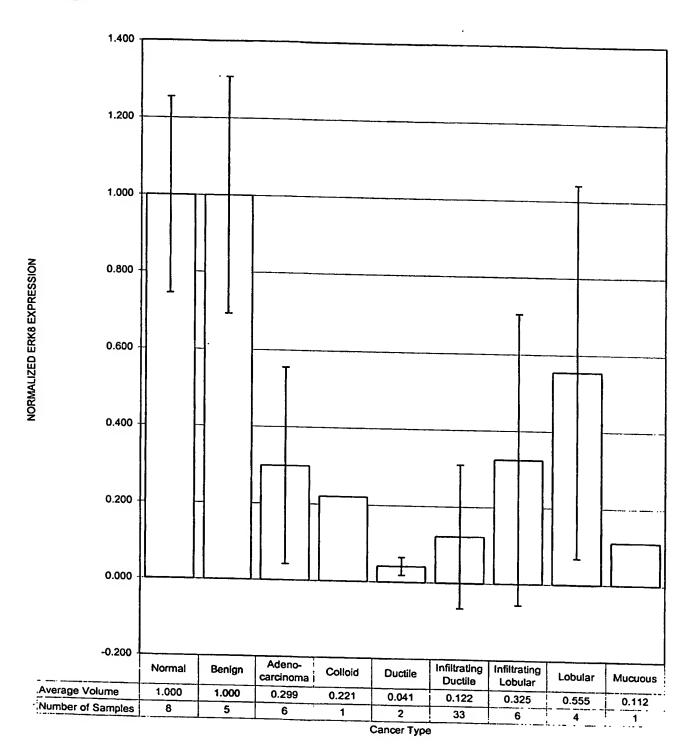
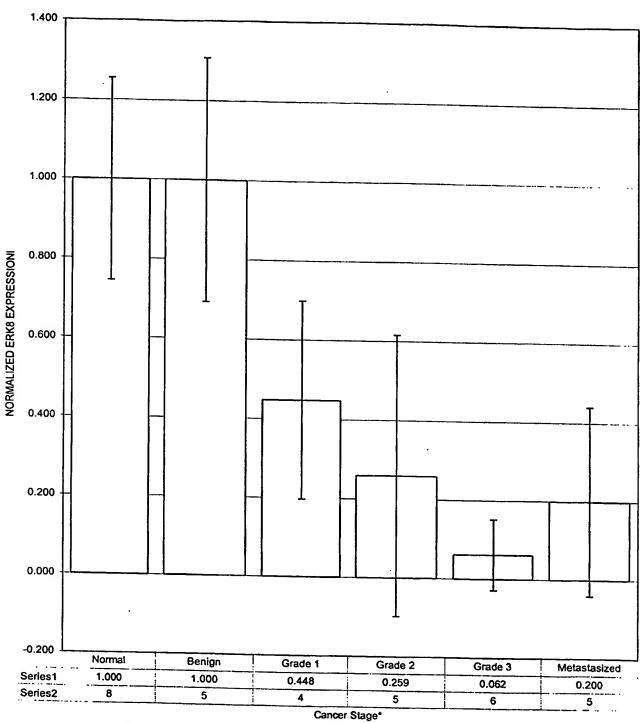
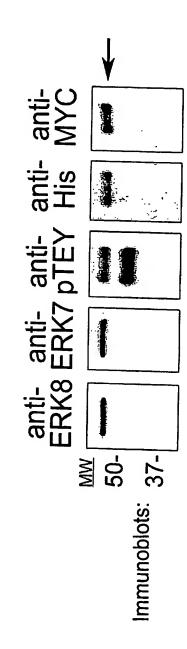


Fig. 5 Erk8 Expression in Breast Cancers of Different Grades



^{*}Cancer Types: Adenocarcinoma, Colloid, Infiltrating Ductal, Infiltrating Lobular, & Lobular



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Fig. 7

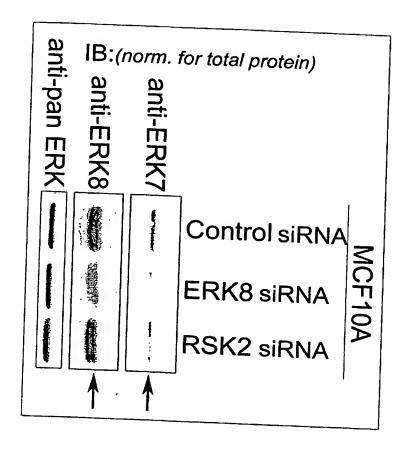


Fig. 8

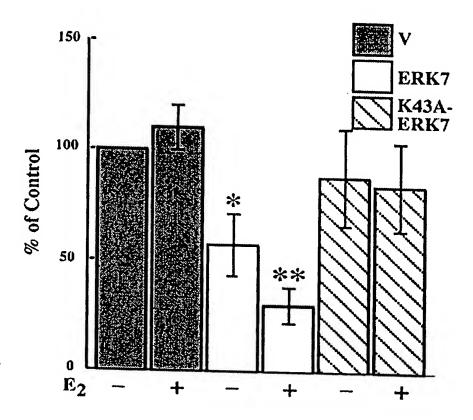
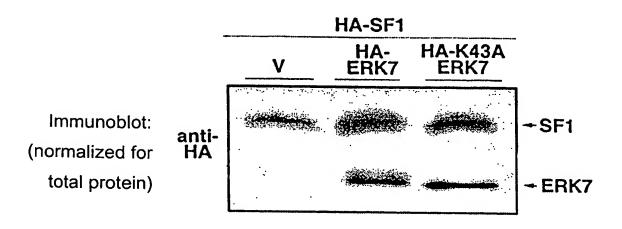
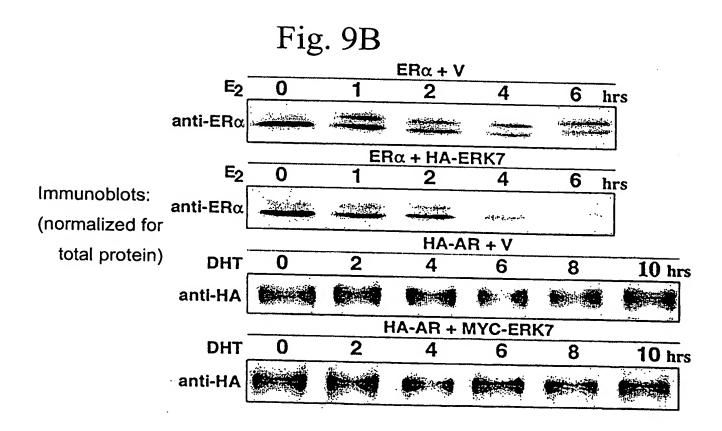


Fig. 9A





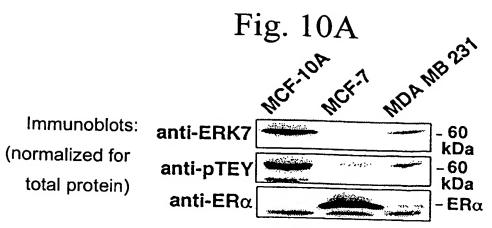


Fig. 10B

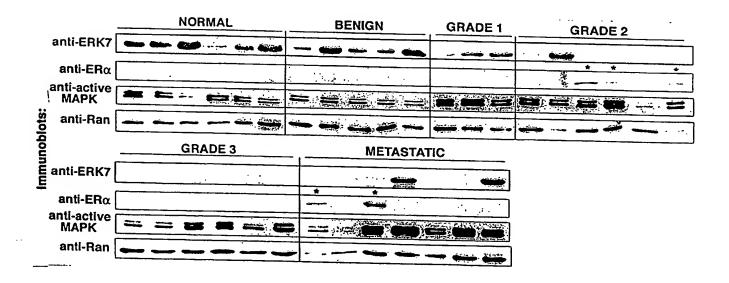


Fig. 11

